

Listing of Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

1.-93. (Canceled)

94. (Currently Amended) A non-naturally occurring single chain Fv protein comprising:

- i) a first polypeptide having a G28-1 single chain Fv binding domain polypeptide, said binding domain polypeptide comprising a heavy chain variable region wherein a serine is at position 11 in the first framework region of the heavy chain variable region;
- ii) a second polypeptide comprising an altered wild type IgG1 immunoglobulin hinge region attached to said first polypeptide, wherein the wild type IgG1 hinge region comprises first, second and third cysteine residues and a proline, wherein the first cysteine is N-terminal to the second cysteine, the second cysteine is N-terminal to the third cysteine, and the third cysteine is N-terminal to the proline, and wherein in the altered hinge region said first and second cysteine residues are substituted with serine and said proline residue is substituted with serine; and
- iii) a third polypeptide comprising an N-terminally truncated immunoglobulin heavy chain constant region polypeptide attached to the second polypeptide, wherein said heavy chain constant region comprises CH2 and CH3 domains from IgG1.

95. (Currently Amended) A non-naturally occurring single chain Fv protein comprising:

- i) a first polypeptide having a G28-1 single chain Fv binding domain polypeptide, said binding domain polypeptide comprising a heavy chain variable region wherein a serine is at position 11 in the first framework region of the heavy chain variable region;
- ii) a second polypeptide comprising an altered wild type IgG1 immunoglobulin hinge region attached to said first polypeptide, wherein the wild type IgG1

hinge region comprises first, second and third cysteine residues and a proline, wherein the first cysteine is N-terminal to the second cysteine, the second cysteine is N-terminal to the third cysteine, and the third cysteine is N-terminal to the proline, and wherein in the altered hinge region, said second cysteine residue is substituted with serine and said proline residue is substituted with serine, and

iii) a third polypeptide comprising an N-terminally truncated immunoglobulin heavy chain constant region polypeptide attached to the second polypeptide, wherein said heavy chain constant region comprises CH2 and CH3 domains from IgG1.

96. (Currently Amended) A non-naturally occurring single chain Fv protein comprising:

i) a first polypeptide having a G28-1 single chain Fv binding domain polypeptide, said binding domain polypeptide comprising a heavy chain variable region wherein a serine is at position 11 in the first framework region of the heavy chain variable region;

ii) a second polypeptide comprising an altered wild type IgG1 immunoglobulin hinge region attached to said first polypeptide, wherein the wild type IgG1 hinge region comprises first, second and third cysteine residues and a proline, wherein the first cysteine is N-terminal to the second cysteine, the second cysteine is N-terminal to the third cysteine, and the third cysteine is N-terminal to the proline, and wherein the altered hinge region said first and second cysteine residues are substituted with serine,

iii) a third polypeptide comprising an N-terminally truncated immunoglobulin heavy chain constant region polypeptide attached to the second polypeptide, said heavy chain constant region comprising CH2 and CH3 domains from IgG1.

97.-109. (Canceled)

110. (Previously Presented) A single chain protein comprising amino acids 21-493 as set forth in SEQ ID NO:326, 328, 330, 374, 376 or 378.

Application No. 10/627,556
Reply to Office Action dated June 24, 2009

111.-112. (Canceled)